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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO
10/087,291	02/28/2002	Shiyan S. Hua	LUT 20079	3105
75	90 11/18/2005		EXAM	INER
John P. Cornely			WOO, ISAAC M	
Fay, Sharpe, Fa	gan, Minnich & McKee,	LLP		
Seventh Floor			ART UNIT	PAPER NUMBER
1100 Superior Avenue			2166	
Cleveland, OH 44114			DATE MAIL ED 11/10/000	-

Please find below and/or attached an Office communication concerning this application or proceeding.

	Application No.	Applicant(s)
	10/087,291	HUA ET AL.
Office Action Summary	Examiner	Art Unit
	Isaac M. Woo	2166
The MAILING DATE of this communication app Period for Reply	ears on the cover sheet with the c	correspondence address
A SHORTENED STATUTORY PERIOD FOR REPLY WHICHEVER IS LONGER, FROM THE MAILING DA  - Extensions of time may be available under the provisions of 37 CFR 1.13 after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period w  - Failure to reply within the set or extended period for reply will, by statute, Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	ATE OF THIS COMMUNICATION 36(a). In no event, however, may a reply be tin vill apply and will expire SIX (6) MONTHS from cause the application to become ABANDONE	N. nely filed the mailing date of this communication. D (35 U.S.C. § 133).
Status		
1) Responsive to communication(s) filed on 19 Second 2a) This action is FINAL.  2b) This 3) Since this application is in condition for allowant closed in accordance with the practice under E	action is non-final. nce except for formal matters, pro	
Disposition of Claims		
4)  Claim(s) 1-20 is/are pending in the application. 4a) Of the above claim(s) is/are withdraw 5)  Claim(s) is/are allowed. 6)  Claim(s) 1-20 is/are rejected. 7)  Claim(s) is/are objected to. 8)  Claim(s) are subject to restriction and/or	vn from consideration.	
Application Papers		•
9) The specification is objected to by the Examiner 10) The drawing(s) filed on is/are: a) access applicant may not request that any objection to the of Replacement drawing sheet(s) including the correction of the oath or declaration is objected to by the Examiner	epted or b) objected to by the ld drawing(s) be held in abeyance. See ion is required if the drawing(s) is ob	e 37 CFR 1.85(a). jected to. See 37 CFR 1.121(d).
Priority under 35 U.S.C. § 119		·
12) Acknowledgment is made of a claim for foreign  a) All b) Some * c) None of:  1. Certified copies of the priority documents  2. Certified copies of the priority documents  3. Copies of the certified copies of the priority application from the International Bureau  * See the attached detailed Office action for a list of	s have been received. s have been received in Applicati ity documents have been receive i (PCT Rule 17.2(a)).	on No ed in this National Stage
Attachment(s)  1) Notice of References Cited (PTO-892)  2) Notice of Draftsperson's Patent Drawing Review (PTO-948)  3) Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date	4) Interview Summary Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	

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### **DETAILED ACTION**

## Response to Pre-Appeal Conference Request

In view of the Pre-Appeal conference request filed on 19 September 2005,
 PROSECUTION IS HEREBY REOPENED. A new ground of rejection set forth below.

To avoid abandonment of the application, appellant must exercise one of the following two options:

- (1) file a reply under 37 CFR 1.111 (if this Office action is non-final) or a reply under 37 CFR 1.113 (if this Office action is final); or,
  - (2) request reinstatement of the appeal.

If reinstatement of the appeal is requested, such request must be accompanied by a supplemental appeal brief, but no new amendments, affidavits (37 CFR 1.130, 1.131 or 1.132) or other evidence are permitted. See 37 CFR 1.193(b)(2).

2. Claims 1-20 are pending.

## Claim Rejections - 35 USC § 101

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

 Claims 1-10 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

As set forth in MPEP 2106 (II) (A):

A. Identify and Understand Any Practical Application Asserted for the Invention

The claimed invention as a whole must accomplish a practical application. That is, it must produce a "useful, concrete and tangible result." State Street, 149 F.3d at 1373, 47 USPQ2d at 1601-02. The purpose of this requirement is to limit patent protection to inventions that possess a certain level of "real world" value, as opposed to subject matter that represents nothing more than an idea or concept, or is simply a starting point for future investigation or research (Brenner v. Manson, 383 U.S. 519, 528-36, 148 USPQ 689, 693-96); In re Ziegler, 992, F.2d 1197, 1200-03, 26 USPQ2d 1600,1603-06 (Fed. Cir. 1993)). Accordingly, a complete disclosure should contain some indication of the practical application for the claimed invention, i.e., why the applicant believes the claimed invention is useful.

Apart from the utility requirement of 35 U.S.C. 101, usefulness under the patent eligibility standard requires significant functionality to be present to satisfy the useful result aspect of the practical application requirement. See Arrhythmia, 958 F.2d at 1057, 22 USPQ2d at 1036. Merely claiming nonfunctional descriptive material stored in a computer-readable medium does not make the invention eligible for patenting. For example, a claim directed to a word processing file stored on a disk may satisfy the utility requirement of 35 U.S.C. 101 since the information stored may have some "real world" value. However, the mere fact that the claim may satisfy

the utility requirement of 35 U.S.C. 101 does not mean that a useful result is achieved under the practical application requirement. The claimed invention as a whole must produce a "useful, concrete and tangible" result to have a practical application.

Regarding claim 1, "A method of searching television programming information" can be implemented without computer or machine. Because the limitation of claim 1, "receiving", "generating", "searching", and "sending" can be implemented by a human with a pencil, and a piece of paper for searching an electronic document. Thus, the languages of claim 1 raises a question as to whether the claimed method is directed merely to an abstract idea that is not tied to a producing a concrete, useful, and tangible result to from the basis of statutory subject matter under 35 U.S. C. § 101. Therefore, the claimed invention is non-statutory subject matter. The claims should be amended to indicate that the subject matter is implemented by a computer, i.e., a computer implemented method.

## Claim Rejections - 35 USC § 103

- 4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

5. Claims 1-20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Junqua et al (U.S. Patent No. 6,314,398, hereinafter, "Junqua") in view of Kaizu et al (U.S. Pub 2004/0015989, hereinafter, "Kaizu").

With respect to claim 1, Junqua discloses, searching a database in accordance with the search query (col. 3, lines 18-44, col. 6, lines 26-26-29), the database containing television programming information (54, program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database); generating search results from the searching (col. 4, lines 14-22), the search results including entries from the database that correspond to the search query; and, sending the search results to a television receiver box (52, set-top decoder box, fig. 1, col. 4, lines 14-22) of the viewer via a television system (50, TV, fig. 1) such that the search results are displayable upon a television operatively connected to the receiver box (46, 50, fig. 1, results are displayed on TV screen, col. 3, lines 7-67 to col. 4, lines 1-55). Junqua does not explicitly disclose, receiving a telephone call from a viewer via a telephone system, generating a search query in response to the telephone call. However, Kaizu discloses, "In step S204, the main control unit 61 judges whether the user has made a voice input through the microphone 43. The step is repeated until a voice input is judged to be made. [0301] If in step S204 the user is judged to have made a voice input (e.g., pronouncing "registered user"), step S205 is reached. In step S205, the main control unit 61 boots the voice recognition program 173 to recognize the voice entered in step S204. From step S205, control is returned to step S202If in step S204 the user is judged to have

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made a voice input (e.g., pronouncing "registered user"), step S205 is reached. In step S205, the main control unit 61 boots the voice recognition program 173 to recognize the voice entered in step S204. From step S205, control is returned to step S202", see (page 17, sections [0300-0301]), [0302] In step S202, the main control unit 61 receives another compact HTML file from the EPG server 10 via the Internet 8, and displays a predetermined screen (log-in screen of FIG. 16 in this case) reflecting the received file on the liquid crystal display 35. At the same time, the sound corresponding to the content of the file is fed to the speaker 34 for output. This causes the speaker 34 to output an audio message, such as "Please pronounce your user ID and password", and "If in step S203 the user is judged to have requested transmission of the recording reservation data, step S206 is reached. In step S206, the main control unit 61 disconnects from the EPG server 10. [0307] Given the transmission request, the EPG server 10 searches the EPG information database (not shown) for the recording reservation data needed to reserve the desired TV program of a specific TV station, retrieves the applicable recording reservation data", see (page 17, sections [0306-0307], fig. 42). This teaches that after the user request telephone call, the telephone is used for searching query. Therefore, it would have been obvious to a person having ordinary skill in the art at the time of the invention was made to modify by incorporating receiving a telephone call from a viewer via a telephone system, generating a search query in response to the telephone call with the system of Kaizu. Thus, one having ordinary skill in the art at the time the invention was made would have been motivated to use such a modification because that would provide Junqua's system the enhanced

database searching method by direct telephone call request in the data retrieval system.

Claim 2 is discussed in claim 1, identifying the viewer from which the telephone call is received via caller ID by Kaizu page 17, section [0302].

Claim 3 is discussed in claim 1, search query is at least partially generated from spoken language from the viewer which is received via the telephone system and input into a voice recognition module by Kaizu page 17, sections [0300-0307].

With respect to claims 4-5, Junqua discloses current television programming information and period of future television programming information are maintained in the database, (54, program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 6, Junqua discloses deactivating the search results after the telephone call has terminated such that they are no longer displayable on the television, (fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 7, Junqua discloses announcing a summary of the search results to the viewer via the telephone system, see (col. 4, lines 14-22).

With respect to claims 8-10, Junqua discloses the search results include a list of channels showing programs which match the search query, wherein the viewer can selectively scroll through the list of channels and the viewer can select a channel from the list of channels to view information about the program being shown on that channel, see (col. 4, lines 14-22).

With respect to claim 11, Junqua discloses, database in which television programming information is maintained, see (54, program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database), searching database in accordance with the search query received, (col. 4, lines 14-22), generating search results which are sent to a television receiver box of the viewer via the television system such that the search results are displayable upon a television operatively connected to the television receiver box, see (46, 50, fig. 1, results are displayed on TV screen, col. 3, lines 7-67 to col. 4, lines 1-55). Junqua does not explicitly disclose, generating a search query in response to the telephone call received from a view a telephone call from a viewer via a telephone system. However, Kaizu discloses, "In step S204, the main control unit 61 judges whether the user has made a voice input through the microphone 43. The step is repeated until a voice input is judged to be made. [0301] If in step S204 the user is judged to have made a voice input (e.g., pronouncing "registered user"), step \$205 is reached. In step \$205, the main control unit 61 boots the voice recognition program 173 to recognize the voice entered in step S204. From step S205, control is returned to step S202lf in step S204 the user is judged to have made a voice input (e.g.,

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pronouncing "registered user"), step S205 is reached. In step S205, the main control unit 61 boots the voice recognition program 173 to recognize the voice entered in step S204. From step S205, control is returned to step S202", see (page 17, sections [0300-0301]), [0302] In step S202, the main control unit 61 receives another compact HTML file from the EPG server 10 via the Internet 8, and displays a predetermined screen (log-in screen of FIG. 16 in this case) reflecting the received file on the liquid crystal display 35. At the same time, the sound corresponding to the content of the file is fed to the speaker 34 for output. This causes the speaker 34 to output an audio message, such as "Please pronounce your user ID and password", and "If in step \$203 the user is judged to have requested transmission of the recording reservation data, step S206 is reached. In step S206, the main control unit 61 disconnects from the EPG server 10. [0307] Given the transmission request, the EPG server 10 searches the EPG information database (not shown) for the recording reservation data needed to reserve the desired TV program of a specific TV station, retrieves the applicable recording reservation data", see (page 17, sections [0306-0307], fig. 42). This teaches that after the user request telephone call, the telephone is used for searching query. Therefore, it would have been obvious to a person having ordinary skill in the art at the time of the invention was made to modify by incorporating generating a search query in response to the telephone call received from a view a telephone call from a viewer via a telephone system with the system of Kaizu. Thus, one having ordinary skill in the art at the time the invention was made would have been motivated to use such a

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modification because that would provide Junqua's system the enhanced database searching method by direct telephone call request in the data retrieval system.

With respect to claim 12, Junqua discloses voice recognition module that receives spoken language from the viewer and converts it into at least a portion of the search query, see (32, speech recognition, fig. 1, col. 3, lines 31-67 to col. 4, lines 1-41).

With respect to claim 13, Junqua discloses current television programming information and period of future television programming information are maintained in the database, see (program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 14, Junqua discloses current television programming information and period of future television programming information are maintained in the database, see (54, program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 15, Junqua discloses the television system is selected from a group consisting of a digital cable television system, an analog cable television system, and a satellite television system, see (program database, fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 16, Junqua discloses the television programming information includes abstractions of program content, see (fig. 1, col. 3, lines 18-44, EPG is stored on program database).

With respect to claim 17, Junqua discloses database includes a searchable field containing identification of program types, see (fig. 1, col. 3, lines 18-44).

Claims 18-19 are discussed in claim 11, identifying the viewer from which the telephone call is received via caller ID by Kaizu page 17, section [0302].

With respect to claim 20, Junqua discloses search results include a list of channels showing programs which match the search query, see (col. 4, lines 14-22).

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### Conclusion

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Isaac M. Woo whose telephone number is (571) 272-4043. The examiner can normally be reached on 8:00-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Hosain T. Alam can be reached on (571) 272-3978. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

IMW November 7, 2005

JEANT CORRIELUS PRIMARY EXAMINER